

REMARKS

Claims 1-6 are pending. In the Office Action mailed September 7, 2006, the Examiner has rejected all the pending claims. Applicant request reconsideration of the claim rejections based on the remarks as set forth herein.

IDS

Applicant notes that its IDS submissions in May and July, 2004 were intended to correct an error in the IDS of February 27, 2004, which incorrectly identified the cited reference as a "European Search Report, November 21, 2003." The reference should have been identified as a "British Search and Examination Report, November 24, 2003." The first attempt at correction was the May, 2004 IDS which incorrectly identified the date of the British Search and Examination Report as November 21, 2003. The July 2004 IDS was then filed to correct the date to November 24, 2003.

Claim Rejections - 35 USC § 102

Claims 1, 3 and 5 are rejected under 35 USC 102(e) as anticipated by U.S. Publication No. 2003/0180582 (Masumoto et al.) However, the Applicant believes that the rejection cannot be supported as the claims as pending based on the disclosure of Masumoto et al.

In rejecting claims 1, 3 and 5, the Office Action states "Masumoto et al. teach a battery having a circuit substrate with a protection circuit element made of a positive temperature coefficient (PTC) material. The battery also includes a resin mold to cover the circuit substrate and provide electrical insulation (Figure 3B; [0017])." Office Action at 2. However, Figure 3B and [0017] does not disclose a "heat protecting element" that "is disposed so as to be separated from a

surface of the battery cell via the resin mold section," as required by claim 1. Rather, Matsumoto et al. discloses a battery pack used in cellular phones wherein "it is important that thermo-sensitive elements, e.g., thermal fuse and positive temperature coefficient elements (PTC elements) are disposed in heat-coupled arrangement with the battery, i.e., they need to be united with the battery." Matsumoto et al. at [0010]. To that end, a battery (101) is disclosed in Matsumoto et al having a pair of engaging members (26) formed on an upper surface of a battery (101). The engaging members (20) enhance the connection between the engaging members (20) and a resin mold (11). In contrast, an object of the present invention is to provide a battery having a structure which does not prevent a rise in temperature of a PTC element (14) having a protective function but instead making use of a rise in heat due to excessive current caused by a short circuit. In the claimed invention, a space defined by an upper surface of a battery cell (2) and the PTC element (14) is filled with a resin mold section (4). Therefore, the battery cell (2) itself will never affect the heat on the PTC element (14) because the space is substantially insulated by the resin mold section (4). However, in Matsumoto et al the resin mold (11) is not formed in a space defined by a PTC element (or thermometer (10)) and the battery (101) as can be clearly seen in each of Figures 3B, 6A, 10B and 16 of Matsumoto et al. Thus, a "heat protecting element" is not "disposed so as to be separated from a surface of the battery cell via the resin mold section," as required by claim 1.

Claim Rejections - 35 USC § 103

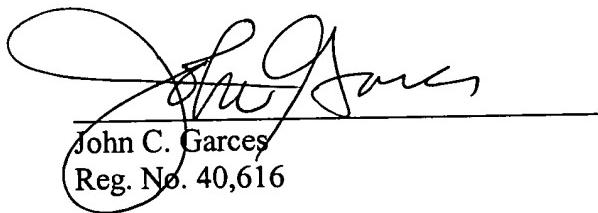
Claims 2, 4 and 6 are rejected under 35 USC 103(a) as obvious over Masumoto et al. in view of U.S. Publication No. 2003/0124420 (Fong et al.). Claims 2, 4 and 6 are not rendered obvious by the cited combination in light of the deficiencies in Masumoto et al. as discussed above.

For the foregoing reasons, Applicant respectfully submits claims 1-6 are allowable over the cited prior art.

The Examiner is urged to telephone Applicant's undersigned counsel at the number noted below if it will advance the prosecution of this application, or with any suggestion to resolve any condition that would impede allowance. In the event that any extension of time is required, Applicant petitions for that extension of time required to make this response timely. Kindly charge any additional fee, or credit any surplus, to Deposit Account No. 50-0675, Order No. 848075-0055.

Respectfully submitted,

Date: December 7, 2006
New York, New York



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CERTIFICATE OF MAILING

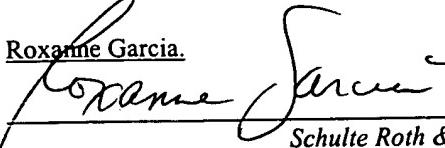
Date of Deposit: December 7, 2006

I hereby certify under 37 C.F.R. 1.8 that this correspondence and enumerated documents are being deposited with the United States Postal Service as First Class Mail with sufficient postage on the date indicated above and is addressed to the Mail Stop - Amendment, Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

Name:

Roxanne Garcia

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